

### **AMENDMENT TO THE SPECIFICATION:**

Please amend the last two (2) paragraphs on page 3 as follows:

--According to one aspect of the present invention, there is provided a velocity estimator using a level crossing rate. The velocity estimator comprises a power calculator for calculating power values of a signal received from a mobile terminal; a mean power calculator for calculating mean power values for M power values according to a predetermined down-sampling factor M; an interpolator for interpolating the mean power values according to a predetermined interpolation ratio L; a root mean square calculator for calculating a root mean square value using an output of the interpolator; a level crossing counter for counting a level crossing frequency representing how many times the output of the interpolator crosses a level crossing threshold determined according to the root mean square value, for a predetermined time period; and a velocity calculator for calculating a velocity estimation value of the mobile terminal using the level ~~velocity~~ crossing frequency.--

--According to another aspect of the present invention, there is provided a velocity estimator using a level crossing rate. The method comprises the steps of calculating power values of a signal down-sampled with a signal received from a mobile terminal; interpolating the power values according to a predetermined interpolation ratio; calculating a root mean square value using the interpolated values, wherein the root mean square value becomes a level crossing threshold; counting a level crossing frequency representing how many times the interpolated values cross the level crossing threshold for a predetermined time period; and calculating a velocity estimation value of the mobile terminal using the level ~~velocity~~ crossing frequency.--